

AMENDMENTS TO THE CLAIMS

1-9. (Canceled)

10. (New) A vehicle-onboard radar system comprising:

a receiving and transmitting unit for receiving and transmitting a radio wave signal,

a signal processing unit for processing said radio wave signal,

an outer housing which is insulative, installs said signal processing unit therein, and has a conductive shielding layer inside thereof,

an electrically conductive member which holds said receiving and transmitting unit, is arranged so as to block up an opening of said outer housing, and is connected to said conductive shielding layer,

wherein said receiving and transmitting unit and said signal processing unit are electrically grounded to one of said conductive shielding layer and said electrically conductive member.

11. (New) A vehicle-onboard radar system as defined in claim 10, wherein said signal processing unit is constructed with a plurality of circuit boards which are stacked up with a common coupling base.

12. (New) A vehicle-onboard radar system as defined in claim 11, wherein said common coupling base is electrically

conductive, and said plurality of circuit boards are electrically grounded through said common coupling base.

13. (New) A vehicle-onboard radar system as defined in claim 10, wherein said outer housing is constructed with an insulative member covered with a conductive member.

14. (New) A vehicle-onboard radar system as defined in claim 10, wherein said outer housing is arranged with a connector to input and output signals and electric power from said receiving and transmitting unit to outside of said radar system on an outside surface thereof.

15. (New) A method for installing a radio wave type radar system on a vehicle comprising the steps of:

installing a receiving and transmitting unit for receiving and transmitting a radio wave signal on an electrically conductive member,

accommodating a signal processing unit for processing said radio wave signal into inside of an outer housing which is insulative and has a conductive shielding layer inside thereof,

arranging an electrically conductive member so as to block up an opening of said outer housing, and simultaneously connecting said conductive shielding layer, and

electrically grounding said receiving and transmitting unit and said signal processing unit to at least one of said conductive shielding layer and said electrically conductive member.

16. (New) A method for installing a radio wave type radar system on a vehicle as defined in claim 15, further comprising the step of constructing said signal processing unit with a plurality of circuit boards which are stacked up with a common coupling base.

17. (New) A method for installing a radio wave type radar system on a vehicle as defined in claim 15, further comprising the steps of constructing said signal processing unit with a plurality of circuit boards stacked up using a common coupling base, and connecting said plurality of circuit boards to ground.

18. (New) A method for installing a radio wave type radar system on a vehicle as defined in claim 15, further comprising the step of constructing said outer housing with an insulating member covered with an electrically conductive member.